

Standards of Learning Instructional Materials and Training Programs

SCIENCE

August 31, 2012

SUMMARY OF PRODUCTS AND PROJECTS

Available online at
http://www.doe.virginia.gov/testing/sol/standards_docs/sol_library/index.shtml

Division of Instruction
Virginia Department of Education
Richmond, Virginia



PROJECT || 2010 Science Standards of Learning and Curriculum Framework**AUDIENCE** *Grades K-12***OVERVIEW**

The 2010 *Science Standards of Learning* comprise the science content that teachers in Virginia are expected to teach and students are expected to learn. The Curriculum Framework details the specific knowledge and skills students must possess to meet the standards for these subjects.

MORE INFORMATION

http://www.doe.virginia.gov/testing/sol/standards_docs/science/

DOE CONTACT PERSON(S)

Eric Rhoades, *Acting Director, Science and Health Education*
(804) 786-2481, Eric.Rhoades@doe.virginia.gov
Barbara Young, *Science Specialist*
(804) 225-2676, Barbara.Young@doe.virginia.gov

**PROJECT || Science Standards of Learning Enhanced Scope and Sequence
Sample Lesson Plans****AUDIENCE** *Grades K-12***OVERVIEW**

The Science Enhanced Scope and Sequence (ESS) Sample Lesson Plans help teachers align instruction with the 2010 *Science Standards of Learning* (SOL) by providing examples of how the knowledge and skills found in the SOL and curriculum framework can be presented to students in the classroom.

MORE INFORMATION

http://www.doe.virginia.gov/testing/sol/standards_docs/science/2010/lesson_plans/

DOE CONTACT PERSON(S)

Eric Rhoades, *Acting Director, Science and Health Education*
(804) 786-2481, Eric.Rhoades@doe.virginia.gov
Barbara Young, *Science Specialist*
(804) 225-2676, Barbara.Young@doe.virginia.gov



PROJECT || Standards of Learning Practice Items

AUDIENCE *Grades 3, 5 and 8, Biology, Earth Science and Chemistry*

OVERVIEW

Practice Standards of Learning items provide examples of test items that reflect the new content and increased rigor of the 2010 *Science Standards of Learning*. Items include examples of technology-enhanced items.

MORE INFORMATION

http://www.doe.virginia.gov/testing/sol/practice_items/index.shtml#science

DOE CONTACT PERSON(S) student_assessment@doe.virginia.gov
(804) 225-2102

PROJECT || Lessons from the Bay

AUDIENCE *Grades 3-6*

OVERVIEW

This resource assists teachers of grades 3 through 6 with incorporating a variety of activities and projects related to protecting and restoring the Chesapeake Bay watershed, in keeping with the state's commitment in the Chesapeake 2000 Agreement.

MORE INFORMATION

http://www.doe.virginia.gov/instruction/science/elementary/lessons_bay/index.shtml

DOE CONTACT PERSON(S) Barbara Young, *Science Specialist*
(804) 225-2676, Barbara.Young@doe.virginia.gov

**PROJECT || Grade 2 Cross-Curricular Model Unit:
Virginia Animals and Their Habitats**

AUDIENCE *Grade 2*

OVERVIEW

This is a model comprehensive, cross-curricular second-grade unit that addresses grade two Virginia Standards of Learning in English, mathematics, science, and history and social science. The unit utilizes inquiry, student teamwork, project-based learning, student journals, and fosters responsible actions toward wildlife and related natural resources.



MORE INFORMATION

http://www.doe.virginia.gov/instruction/cross-curricular_instruction/science/animals_habitats/index.shtml

DOE CONTACT PERSON(S) Barbara Young, *Science Specialist*
(804) 225-2676, Barbara.Young@doe.virginia.gov

PROJECT || Project PROMISE Science Curriculum Units for Grades K-3

AUDIENCE *Grades K-3*

OVERVIEW

This science curriculum was developed by trained teachers and field-tested in three school divisions. It includes hands-on, inquiry-based learning where the students are actively engaged in learning and solving authentic problems. The units cover life science, Earth science, and physical science for kindergarten through grade three.

MORE INFORMATION

http://www.doe.virginia.gov/instruction/gifted_ed/project_promise/index.shtml

DOE CONTACT PERSON(S) Barbara Young, *Science Specialist*
(804) 225-2676, Barbara.Young@doe.virginia.gov

PROJECT || Technology Sparks, Ideas for Teachers: Integrating Technology with the Virginia Standards of Learning

AUDIENCE *Grade 6, Life Science, and Physical Science*

OVERVIEW

This resource is designed for middle school teachers to provide resources and suggestions for incorporating technology into the Virginia Standards of Learning (SOL) middle school core curricular subjects.

MORE INFORMATION

http://www.doe.virginia.gov/instruction/career_technical/resources/technology_sparks.pdf

DOE CONTACT PERSON(S) Eric Rhoades, *Acting Director, Science and Health Education*
(804) 786-2481, Eric.Rhoades@doe.virginia.gov



PROJECT || Share the Skies

AUDIENCE *Grade 6, Life Science, and Physical Science*

OVERVIEW

This resource is designed to enable Virginia teachers and students to access and control research-grade telescopes to explore Australia's night skies via the Internet. Teachers and students use CCD (charge-coupled device) imaging techniques to capture digital images of deep space for further study.

MORE INFORMATION

<http://www.sharetheskies.org/home.cfm>

DOE CONTACT PERSON(S)

Eric Rhoades, *Acting Director, Science and Health Education*
(804) 786-2481, Eric.Rhoades@doe.virginia.gov

